

Docket No. 215051U

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

IN RE APPLICATION OF: Nobunao IKEWAKI, et al.

SERIAL NO: 09/986,535

GAU: 1623

FILED: November 9, 2001

EXAMINER: Josephine Young

FOR: BETA-1.3-1.6 GLUCAN (AUREOBASIDIUM MEDIUM)

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INFORMATION DISCLOSURE STATEMENT UNDER 37 CFR 1.97

COMMISSIONER FOR PATENTS  
ALEXANDRIA, VIRGINIA 22313

SIR:

Applicant(s) wish to disclose the following information.

REFERENCES

- ☒ The applicant(s) wish to make of record the references listed on the attached form PTO-1449. Copies of the listed references are attached, where required, as are either statements of relevancy or any readily available English translations of pertinent portions of any non-English language references.
- ☒ A check is attached in the amount required under 37 CFR §1.17(p).

RELATED CASES

- ☐ Attached is a list of applicant's pending application(s) or issued patent(s) which may be related to the present application. A copy of the patent(s), together with a copy of the claims and drawings of the pending application(s) is attached along with PTO 1449.
- ☐ A check is attached in the amount required under 37 CFR §1.17(p).

CERTIFICATION

- ☐ Each item of information contained in this information disclosure statement was first cited in a communication from a foreign patent office in a counterpart foreign application not more than three months prior to the filing of this statement.
- ☐ No item of information contained in this information disclosure statement was cited in a communication from a foreign patent office in a counterpart foreign application or, to the knowledge of the undersigned, having made reasonable inquiry, was known to any individual designated in 37 CFR §1.56(c) more than three months prior to the filing of this statement.

DEPOSIT ACCOUNT

- ☒ Please charge any additional fees for the papers being filed herewith and for which no check or credit card payment form is enclosed herewith, or credit any overpayment to deposit account number 15-0030. A duplicate copy of this sheet is enclosed.

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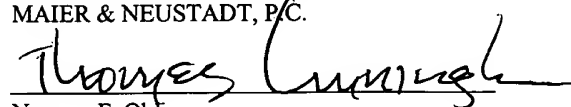


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Respectfully submitted,

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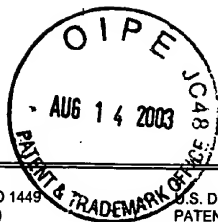
Form PTO (Modified)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY DOCKET NO. 215051US0		SERIAL NO. 09/986,525	
LIST OF REFERENCES CITED BY APPLICANT				APPLICANT Nobunao IKEWAKI, et al.		GROUP 1623	
				FILING DATE November 9, 2001			
U.S. PATENT DOCUMENTS							
EXAMINER INITIAL		DOCUMENT NUMBER	DATE	NAME	CLASS	SUB CLASS	FILING DATE IF APPROPRIATE
	AA	5,789,579	8/4/98	FUJII et al.	536	119	
	AB						
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		DOCUMENT NUMBER	DATE	COUNTRY	TRANSLATION YES NO		
	AO						
	AP						
	AQ						
	AR						
	AS						
	AT						
	AU						
	AV						
OTHER REFERENCES (Including Author, Title, Date, Pertinent Pages, etc.)							
	AW	ABEL et al., "Stimulation of Human Monocyte $\beta$ -Glucan Receptors by Glucan Particles Induces Production of TNF- $\alpha$ and IL-1 $\beta$ ," Int. J. Immunopharmacology, Vol. 14, No. 8, 1992, pp. 1363-1373.					
	AX	CZOP et al., "Isolation and Characterization of $\beta$ -Glucan Receptors on Human Mononuclear Phagocytes," J. Exp. Med., Volume 173, June 1991, pp. 1511-1520.					
	AY	CZOP et al., "Phagocytosis of Particulate Activators of the Human Alternative Complement Pathway Through Monocyte $\beta$ -Glucan Receptors," Biochemistry of the Acute Allergic Reactions: Fifth International Symposium, June 20-21, 1988, pp. 287-296.					
	AZ	DI RENZO et al., "The function of human Nk cells is enhanced by $\beta$ -glucan, a ligand of CR3 (CD11b/CD18)*," Eur. J. Immunol., 1992, 21, pp. 1755-1758.				<input checked="" type="checkbox"/> Additional References sheet(s) attached	
Examiner					Date Considered		
*Examiner: Initial if reference is considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.							

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Form PTO-609 (Modified)		U.S. DEPARTMENT OF COMMERCE PATENT AND TRADEMARK OFFICE		ATTY DOCKET NO.  215051US0	SERIAL NO.  09/986,535
LIST OF REFERENCES CITED BY APPLICANT				APPLICANT  Nobunao IKEWAKI, et al.	
				FILING DATE  November 9, 2001	GROUP  1623
OTHER REFERENCES (Including Author, Title, Date, Pertinent Pages, etc.)					
AAA	ELSTAD et al., "CD11b/CD18 Integrin and a $\beta$ -glucan Receptor Act in Concert to Induce the Synthesis of Platelet-Activating Factor by Monocytes1," J. Immunol., Vol. 152, 1994, pp. 220-230				
AAB	HETLAND et al., "Protective Effect of $\beta$ -Glucan Against Mycobacterium bovis, BCG Infection in BALB/c Mice," Scand. J. Immunol., 47, 1998, pp. 548-553				
AAC	JESPERSGAARD et al., "Protective Immunity against Streptococcus mutans Infection in Mice after Intranasal Immunization with the Glucan-Binding Region of S. mutans Glucosyltransferase," Infection and Immunity, Vol. 67, No. 12, Dec. 1999, pp. 6543-6549				
AAD	KAY et al., "Enhancement of human monocyte $\beta$ -glucan receptors by glucocorticoids," Immunology, 81, 1994, pp. 96-102. ROSS et al., "Specificity of Membrane Complement Receptor Type Three (CR <sub>3</sub> ) for $\beta$ -Glucans," Complement 4, 1987, pp. 61-74.				
AAE	KOMATSU et al., "Host-Mediated Antitumor Action of Schizophyllan, A Glucan Produced by Schizophyllum Commune," GANN, 60, April 1969, pp. 137-144.				
AAF	MCLEISH et al., "Bacterial phagocytosis activates extracellular signal-regulated kinase and p38 mitogen-activated protein kinase cascades in human neutrophils," Journal of Leukocyte Biology, Volume 64, December 1998, pp. 835-844				
AAG	MOERK et al., "Effects of particulate and soluble (1-3)- $\beta$ -glucans on Ca <sup>2+</sup> influx in NR8383 alveolar macrophages," Immunopharmacology 40, 1998, pp. 77-89.				
AAH	NOBUTAKE, "Kobunshi Kako. (Polymer Applications), Kobunshi Kankokai., vol. 36, no. 5, 1987, pp. 9-16.				
AAI	OI et al., "Structural Studies on "Isosclerotan", a New Glucan Isolated from Sclerotinia Fungus, by Physical, Chemical and Enzymatic Methods," Agr. Biol. Chem., Vol. 30, No. 3, 1966, pp. 266-273.				
AAJ	PATCHEN et al., "Glucan-Induced Hemopoietic and Immune Stimulation: Therapeutic Effects in Sublethally and Lethally Irradiated Mice," Meth and Find Exptl Clin Pharmacolo, 1986, 8(3), pp. 151-155				
AAK	POUTSIKA et al., "Cross-Linking of the $\beta$ -Glucan Receptor on Human Monocytes Results in Interleukin-1 Receptor Antagonist But Not Interleukin-1 Production," Blood, Vol. 82, No. 12, December 15, 1993, pp. 3695-3700.				
AAL	ROSS et al., "Therapeutic intervention with complement and $\beta$ -glucan in cancer," Immunopharmacology 42, 1999, pp. 61-74.				
AAM	ROSS et al., "Specificity of Membrane Complement Receptor Type Three (CR <sub>3</sub> ) for $\beta$ -Glucans," Complement 4, 1987, pp. 61-74.				
AAN	SINGH et al., "Scleroglucan, an antitumor polysaccharide from Sclerotium glaucum," Carbohydrate Research, 37, 1974, pp. 245-247.				
AAO	SMILEY, "Microbial Polysaccharides - A Review," Food Technology, September 1966, pp. 112-116.				
AAP	SZCZESNIAK et al., "Objective Characterization of the Mouthfeel of Gum Solutions," Journal of Food Science, Volume 27, Number 4, July-August 1962, pp. 381-385.				
AAQ	TERAMOTO, "Markedly increased plasma (1 $\rightarrow$ 3) $\beta$ -D-glucan is a diagnostic and therapeutic indicator of Pneumocystis carinii pneumonia in a non-AIDS patient," Journal of Medical Microbiology, vol. 49, 2000, pp. 393-394.				
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GROUP  1623					
OTHER REFERENCES (Including Author, Title, Date, Pertinent Pages, etc.)					
	BAA	THORNTON et al., "Analysis of the Sugar Specificity and Molecular Location of the $\beta$ -Glucan-Binding Lectin Site of Complement Receptor Type 3 (CD11b/SC18)," J. Immunol., Vol. 156, 1996, pp. 1235-1246			
	BAB	WAKSHULL et al., "PGG-Glucan, a soluble $\beta$ -(1,3)-glucan, enhances the oxidative burst response, microbicidal activity, and activates an NF- $\kappa$ B-like factor in human PMN: Evidence for a glycosphingolipid $\beta$ -(1,3)-glucan receptor," Immunopharmacology 41, 1999, pp. 89-107.			
	BAC	XIA et al., "Generation of Recombinant Fragments of CD11b Expressing the Functional $\beta$ -Glucan-Binding Lectin Site of CR3 (CD11b/CD18)", J. Immunol., Vol. 162, 1999, pp. 7285-7293.			
	BAD	XIA et al., "The $\beta$ -Glucan-Binding Lectin Site of Mouse CR3 (CD11b/CD18) and Its Function in Generating a Primed State of the Receptor That Mediates Cytotoxic Activation in Response to iC3b-Opsonized Target Cells", The American Association of Immunologists, 1999, pp. 2281-2290			
	BAE	YAN et al., " $\beta$ -Glucan, a "Specific" Biologic Response Modifier That Uses Antibodies to Target Tumors for Cytotoxic Recognition by Leukocyte Complement Receptor Type 3 (CD11 b/CD18)", J. Immunol., Vol. 163, 1999, pp. 3045-3052.			
	BAF	YOSHIOKA et al., "Immunotoxicity of soluble $\beta$ -glucans induced by indomethacin treatment," FEMS Immunology and Medical Microbiology, 21, 1998, pp. 171-179.			
	BAG				
	BAH				
	BAI				
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	BAK				
	BAL				
	BAM				
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	BAO				
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